DOCUMENT RESUME

ED 266 056 SO 016 880

AUTHOR Kelly, Eugene W.
TITLE Curriculum Power: Thinking Futuristically, Acting Realistically.
PUB DATE Apr 85
NOTE 22p.; Paper presented to the Curriculum Advisory Council (Montgomery County, PA, April 26, 1985).
PUB TYPE Viewpoints (120) -- Speeches/Conference Papers (150)

EDRS PRICE MF01/PC01 Plus Postage.
DESCRIPTORS Comparative Analysis; Course Descriptions; Curriculum Development; *Futures (of Society); Secondary Education; Social Indicators; Social Studies; Teaching Methods; *Trend Analysis

ABSTRACT

Focusing on whether or not it is worthwhile to think and to study about the future, presenting methods for effectively thinking about and studying about the future, and suggesting methods for introducting future studies into the curriculum, this paper argues that the ultimate purpose of futurism in education is to help learners cope with real-life crises, opportunities, perils, and especially with the individual's practical ability to anticipate and adapt to change. Following a rationale for future studies, four broad generalizations from the list drawn up by Fitch and Svengalis (1979) to characterize the definitions and methodologies of futurism are presented as providing especially useful pespectives. Next, generalizations relevant to curriculum and instruction at the senior high school level are examined. In a discussion of two methods used by futurists (The Future Wheel and trend analysis), the author describes three recent publications identifying top trends. A summary of four elements that current future studies courses have in common is followed by an approach using separate futurism units in social studies courses. The paper concludes with references; a list of top trends in 1984 identified in "U.S. News & World Report," "Futureletter," and "Megatrends;" a list of separate units on futurism for standard courses in American history, world history, sociology, and psychology courses; and a course outline. (LH)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

U.S. DEPARTMENT OF EDUCATION
NATIONAL INSTITUTE OF EDUCATION
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

☐ This document has been reproduced as received from the person or organization originating it.

☒ Minor changes have been made to improve reproduction quality.

• Points of view or opinions stated in this document do not necessarily represent official NIE position or policy.

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

Eugene W. Kelly

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

ED266056

CURRICULUM POWER:
THINKING FUTURISTICALLY, ACTING REALISTICALLY

by
Eugene W. Kelly
George Washington University

April 1985

CG 018 880

Paper presented to the Curriculum Advisory Council (Montgomery County, PA, April 26, 1985).

CURRICULUM POWER:
THINKING FUTURISTICALLY, ACTING REALISTICALLY

Eugene W. Kelly, Jr., Dean
School of Education and Human Development
George Washington University

Presented to
Montgomery County (PA) Curriculum Developers Advisory Council
April 26, 1985

Good morning and thank you for the opportunity to work with you today. It was over a year ago that George Bonekemper spoke with me briefly at a Teacher Effectiveness Conference in Arlington, Virginia about my interests in being a presenter and working with you one one of your regularly scheduled professional meetings. I was intrigued then and subsequently pleased when Don Wright called me to extend an invitation and make arrangements for this day. For a whole array of reasons, all of which I think are good and valid, I am delighted to be with you today. But I'll not bother you with those reasons; rather I'll get right into the topic and business at hand. As you can see from your schedule, I'll take about 45 minutes for my presentation. Then there will be about 15 minutes for initial questions, comments, challenges and ideas from you. After a break, we'll then spend about 75 minutes doing some futures type work to cap off all our talking about it.

A recent issue (2-3-85) of The Washington Post ran an article under the title, "Soon Drugs May Make Us Smarter." And the subheadline to the article asked, "But If We Use These 'Brain Steroids' Will Nobel Laureates Need Urine Tests?" But don't be misled by that facetious question. Scientists view this as very serious business and speak of a future in cognitive activity that could be radically different from what we know now. Dr. James McGaw, director of the Center for Neurbiology of Learning and Memory at the University of California at Irvine says, "The basic science of neuropeptides and neurotransmitters...is exploding at the present time." And Dr. Herbert Weingartener, chief of cognitive studies at the National Institute of Mental Health says, "This is space travel of a different type....We're sitting on a revolution that rivals quantum physics in the 1920's."

Of course, this startling glimpse into a possible future has special relevance for educators. It should be especially interesting to us because of its implications for learning and schooling. But that is not why I mention it here. I bring it up, instead, because it raises, dramatically and immediately, many of the key questions about the future and futures studies. Many of these are pressing values questions - questions that turn up again and again among futurists, and just plain folks who wonder, and perhaps worry, about the future. Priscilla Griffith, a high school teacher in Melbourne High School in Florida and designer of a trail-blazing high school futures course in the mid-1960's, asks some of these crucial questions this way: "Attempting to teach about the future is necessarily bound up, as all education should be, with such questions as What is man? Why is he here? What is the purpose of human life? What values are

important and necessary in order to lead a truly human life? What is a truly human life? What kind of future or futures does man want? And what futures are his present practices likely to bring him?" (1974, p.215).

To these ethical and practical questions, which by the way, are painfully real for the psychopharmocalogists and neurobiologists of cognition, we can add other questions: How do we sort between possible, preferable and desirable futures? How can we systematically study the future, events that have not yet occurred? Can a study of the future, or futures studies if you will, make a difference in the way we think and act in the present? Can young persons, so immersed in the concerns of the present, relationships with their peers, and the struggle with their own identity, be effectively engaged in future studies and can they benefit from such studies? And if so, how can the schools, already pressed to go back to basics and prune away the frills, integrate future studies into an already crowded curriculum?

These questions set the stage, or at least provide a backdrop, for our work today. In this presentation, I'm going to follow the principle that Jim Popham, a very fine speaker, follows in his presentations. Popham says that most persons can effectively remember only three points from a presentation. So like him I'm going to limit this talk to three major points. Here are the 3 points, put in the forms of questions, that I will make in the next 40 minutes:

First - Thinking About The Future: Is it worthwhile to think about and study the future, and if so, why?

Second - Thinking About the Future: What are the methods for effectively thinking about and systematically studying the future?

Third - Planning For The Future Through Education: How can we introduce future studies into the curriculum?

So these are the three points and major parts of my talk: One: The value of future studies: Is it worthwhile, and if so, why? Two: The methods of futures studies: What are the methods for effectively and systematically studying and thinking about the future. Three: Curriculum for futures studies: How do we initiate futures studies in the schools and what are the key ingredients?

So, point one: Thinking and studying about the future: Is it worthwhile?

Fitch and Svengalis, in a fine little book titled, Futures Unlimited: Teaching About Worlds To Come (1979), write that

"the future is an idea often referred to but seldom reflected upon" (p.2). According to them there is a kind of natural aversion for people to reflect upon the future. They hypothesize that the aversion to, or at least neglect of, futures thinking comes from the anxiety that thinking about the future produces. They also quote Donald Michael who warns us that "Trying to think seriously about the future poses (a) challenge to one's sense of competence [because] additional complex and unfamiliar information must be absorbed and incorporated."

To these psychological hypotheses about an aversion to thinking about the future, we can all add our own observations, based on experience and informed common sense, that today, tomorrow and the next few weeks give most people enough to think about, even more than they want to think about. The lament of Scarlett O'Hara, "I'll think about that tomorrow," becomes a guiding principle. We are quite willing to embrace and generalize to our whole lives the Biblical injunction, "Sufficient for the day is the evil thereof."

And if you are an educator, the idea of future studies becoming a component of the curriculum sounds suspiciously like one of those special interest fads to which schools are unceasingly subjected. And, finally (but not really finally), if you are an administrator or supervisor, there are so many basic, nitty-gritty things to do from day-to-day that something so etheral-sounding as futures studies may not seem very enticing, or at least worth squeezing in.

Well, in response to all this aversion and intellectual foot-dragging - not to put to fine a point on it - and to quote my educator-spouse - : "Au contraire!" However, since I suspect that this rebuttal may not have the same force for you that it sometimes has on me, let me go on to be explicit about the value of futures thinking and futures studies.

Several years ago I participated in a small group discussion which several top level administrators in the U.S. Department of Education had with Dr. Aurelio Peccei, a leader of the prestigious Club of Rome, an influential group of international experts. Dr. Peccei was eloquent, even passionate, in encouraging the Department's leaders to think creatively about the future. At one point, after these administators had persistently confronted him with their busy schedules and the difficulties of thinking about the future, he paused and said simply, "Confronted with the choice of thinking about tomorrow and five years from now, I would choose to think about five years from now." I was struck both by his quiet conviction and the subsequent rationale he gave for his remark.

Perhaps Dr. Peccei's remark could be discounted as the

enthusiasm of a brilliant and committed futures thinker. But allow me just one more anecdote, much closer in time and more down to earth, if you will. About a month ago, I had a long conversation with Bill Cody, superintendent of the large and very busy public school system of Montgomery County, Maryland. It was a conversation about matters unrelated to futures studies. At one point in the conversation, when I commented on the tremendous number of concerns that daily pressed on him, Bill responded on how important it was not to get bogged down in the present. He went on to say that he had recently set up a two-person office specifically to do issues analysis. He said he knows it's not much, but at least he will have persons talking with him and advising him on the future rather than letting the future just roll over the school system.

Let me move from the level of anecdote to outline very briefly why the study of the future is important, even urgent. Edward Cornish, President of the World Future Society, when writing about a philosophy of futurism, highlights the importance of thinking systematically in the future tense. Futures thinking is needed because of "1) the unity or interconnectedness of reality." Just a moment of unbiased reflection will convince us of the interdependence, not only of present events, but also of future events with the present. Secondly, Cornish lists the crucial importance of time, noting how our present has been shaped by past choices, and therefore the necessity of a future focus to guide our present choices.

Third, Cornish emphasizes "the importance of ideas, especially ideas about the future." Events throughout the world are being shaped by powerful ideas or images of the future (Cornish, 1978). Did you know that there are estimated to be in the United States 8 million "dispensational millenialists", whose future image of a nuclear Armageddon, will usher in a 1000 year reign of the Christian elect and a few Jewish converts (Sawyer, 1985) ? Consider the potential influence of this remarkable and powerful image on present political and social decisions. And what still untold effect did the playboy philosophy and the image of a society without sexual restraints have on the public explosion of pornography and sexual permissiveness of the 1960's and 1970's? Think of the powerful image of man in space that drives scientists at NASA, the vision of a land of unblemished beauty that fired up Teddy Roosevelt, the dream of a just society that sustained Martin Luther King, Jr., the promise of a homeland that guides Israel, and the notion of invincibility - or is it superiority and ultimately prevailing? - that leads the world's two great superpowers to God knows where. In short, ideas and images of the future can have a powerful influence on actual events.

Returning briefly to the related issues of time and change,

clearly the two are being compressed so that we are getting more change over shorter periods of time. The so-called J-curve is a graphic illustration of how, in many areas, the gradual change of the past has become the accelerated change of the present and the rush of the future. We are experiencing unprecedented and increasingly escalated change. What is more, many of the issues, especially the problems, are worldwide: e.g., the threat of nuclear war, population and food supplies, pollution.

Looking for a moment just at North America, a few selected statistics illustrate the scope of change we are and will be experiencing. For example by 1994, nearly 48 million North American television viewers will be using roof-top antennas ("dishes") for direct reception of programs through private antennas, thus bypassing local broadcasting stations and cable systems. Direct broadcasting (DBS) channels will offer a wealth of programs appealing to special interests in such areas as sports, cooking, gardening and medicine.

In the United States, our population will, in a sense, become older and younger at the same time. The U.S. population over 65 will rise from 11.6% of the total in 1982 to 21.2% in 2030 and 23.5% in 2080. During part of the same time frame the number of children under age 6 will grow from 19 million in 1985 to 23 million in 1990. As a society we are facing the challenge of meeting the growing needs of both older people and the very young at the same time. The latter part of this challenge is complicated by the continuation of what the World Labour Report calls the greatest economic change in the past 20 years, namely the growing proportion of women in the workforce. At present 50% of U.S. mothers with preschoolers are working. It's fair to ask: How well are we educating for the future, indeed for the present?

Returning to the area of technology, one-fourth of all U.S. households now have at least one member who uses a personal computer either at home or at school. More than 20% of all households with children have at least one child who uses a computer at home. In one respect the future is now, and we should be preparing for many tomorrows when these percentages of computer use will go even higher.

Not only the number of computers, but also the nature of computers is about to change drastically. A confident estimate is that by 1989 computers 1000 times more powerful than present machines will be available from Japan. The same progress is expected by a consortium of U.S. computer manufacturers by 1990. What new implications will this have for automation in heavy industry and the shift of jobs, for space exploration, for medical research, for education and schooling?

But change in the United States is only part of a much

larger picture. Clearly and increasingly the U.S. is intertwined with a rapidly changing global picture. As indicators of the U.S. involvement in this global age, John Steinbrink (1983) of the University of Houston, lists the following: one of six Americans has a job directly related to international trade, one of every four acres of farmland in the U.S. is devoted solely to exports; more than half of the wheat, soybeans and rice produced in the U.S. are exported; more than 134 million people in the world speak Arabic, the language of oil, as a principal language; the U.S. is the fourth or fifth largest Spanish-speaking nation in the world.

One final future statistic to ponder. Maurice Kirk, a demographer at the University of Leeds in Great Britain, in a balanced and excellent analysis of population projections, writes: "Recent, current, and likely future (population) growths rates will probably take us to a world population of 10 billion (two and a half times that of 1975 and four times that of 1950) by the middle of the next century. The uncertainty ahead is considerable, but the probability of reaching 10 billion is at least as great as that of falling significantly short of it" (1984, p. 128). Of special concern is that probable growth rates are uneven across countries, with the highest rates occurring in those parts of the world least able to cope with the immense strain that such growth will put on existing political and economic systems. One does not have to be a pessimist to appreciate our need to understand and plan for growing populations throughout the world.

Although there is much evidence to support the value of future studies not everyone is convinced. Louis Rubin notes that, although future-oriented courses in a number of secondary schools have been successful in recent years, nevertheless "parents and students have tended to worry about the practical utility of studying conjectural forecasts and speculating about unknowns, particularly since such courses consume time that might otherwise be spent on traditional subject matter" (Rubin, 1975). In response to this understandable concern, I would argue that attention to the basics and traditional subjects must be complemented with attention to our students' needs for the skills of critical intelligence and critical analysis, and the ability to apply basic and critical skills, not only in traditional subjects but also to the critical social, technological and ethical issues toward which we are rushing in the future.

Let me close point one on the value of futures thinking with brief quotes from two futurists: one from Louis Rubin, the other from Wendell Bell. Rubin, a university educator, says: "Because tomorrow's citizenry will be called upon to make sensitive choices among conflicting priorities, life-styles, and social patterns, the curriculum of future schools will need to treat, in

varying contexts, the processes through which people identify problems, gather and verify evidence, judge probable consequences, and reach decisions" (1975, p. 201). And Bell, a sociologist writes: 'Because taming the future requires active participation, freedom from past ways, and some degrees of choice, the student role must become less passive than it has been, without at the same, time permitting a surrender to mere self-indulgence or expression. As psychological, economic, political, cultural, and social change swirl around them, can students, as many educational philosophers have stressed, be taught to learn to learn? How prepared are the social sciences today to educate for the future?" (1974, p. 76).

With that pointed question, let us move from point one, the value of futures studies, to point two, the methods of thinking effectively and systematically about the future.

The methods of futurism, as futurists constantly point out, are not for the purpose of predicting the future or constructing and portraying absolutely clear pictures of future events. "The ultimate purpose of futurism in education," according to Alvin Toffler, "is not to create elegantly complex, well-ordered, accurate images of the future, but to help learners cope with real-life crises, opportunities and perils. It is to strengthen the individual's practical ability to anticipate and adapt to change, whether through invention, informed acquiescence, or through intelligent resistance" (1974, p. 13).

Fitch and Svengalis (1979) list 17 broad generalizations which characterize the definitions and mothodologies of futurism. Four of them in particular provide a useful perspective on the methods of futures studies:

> 1. Futurism is primarily concerned with enlarging and extending social perspectives, and with developing beetter and more sophisticated ways of thinking about the future.
>
> 3. Futurism is concerned with predictions and forecasts about the future. But, more importantly, futurism is concerned with helping individuals develop understandings, attitudes, and abilities which in turn can help them deal with change and with the social responsibilities of living in a technological society.
>
> 6. Futurism is the study of alternatives. It is based on the idea that there is not one future but many possible futures, with individual and collective choice playing important roles in influencing the actual future which

occurs.

15. Although there are many pessimistic scenarios about the future, futurism is basically optimistic. Much of the literature is based on the attitude that, though problems of great magnitude exist, human intelligence can be applied in more deliberate ways to deal successfully with them.

In addition to these four major perspectives, other characteristics of futurism are (1) a deep concern about change and its consequences, (2) an interdisciplinary approach and perspective including a wide variety of ideological persuasions, (3) a global perspective, (4) an ecological concern, and (5) a humanistic as well as technological perspective on the future.

The methods of futurists are designed, again using the words of Toffler, "to study alternatives, to develop long-range plans, to think in terms of contingencies - and especially to think through consequences" (1974, pp. 17-18). The methods of futurist help us to expect the unexpected, or in the words of Harold Shane, the prominent educator-futurist, to "be ready to be surprised" (1975, p. 104).

Before presenting a overview description of the major methods used by futurists, let me briefly say a word about the futurists themselves, that is, about key thinkers and leaders in the field of future studies. Every teacher who prepares a course or course module on future studies will become familiar with these and other futurists and will be stimulated and informed by their work.

Fitch and Svengalis (1979) note that the academic and scientific approach to futurism can be traced to the work of four European scholars. Futures studies in the United States has derived many of its theoretical foundations from these European thinkers.

In the 1940's Ossip Flechtheim, who coined the term "futurology", wrote about a set of methods to facilitate a radical-constructive " criticism of the status quo" and to get societies to become more future oriented. For Flechtheim futurology was closely related to history and could be characterized as a projection of history into a new time dimension with the use of projections, predictions, and planning procedures.

A giant in the field of futurism is Bertrand de Jouvenal who emphasized the term "futuribles" to denote those things which can be deduced by the mind from the present state of things, but

which do not yet exist. He makes a crucial distinction between the past, which is largely knowable and unchangable, and the future which is a field of uncertainty but also a field of liberty and power, full of likelihoods, possibilities and probabilities. Noting that there are no "guidebooks" or "roadmaps" for the unprecedented change pressing on us, de Jouvenal says that we need a variety of anticipatory tools to direct ourselves intelligently and to explore and plan for alternative futures.

Fred Polack, a Dutch scholar, has developed the concept of "images of the futures" and writes that through qualitative methods (e.g., intuition and creativity) as well as quantitative methods (e.g., computers) we need to imagine and preview the future so that we can shape it. Robert Jungk, founder of the European Mankind 2000 project, emphasizes a practical orientation toward "doing" the future. His approach to future studies stresses two major needs: (1) the need for broad, democratic participation in the process of determining societal goals, and (2) the need to transform educational systems and other institutions to produce imagnative and creative persons to achieve desirable futures.

In the United States several persons have taken a leading role in futures studies. Everyone is familiar with Alvin Toffler and his immensely popular Future Shock and The Third Wave. Toffler, primarily a journalist and popularizer, has made significant contributions toward futures thinking. Toffler vividly portrays the immensity of change we are now experiencing and stresses the need to plan for and cope with change through anticipatory democracy and adjustments to anticipate future values and massive societal, global and economic changes. Other outstanding American futurists include Daniel Bell, a Harvard sociologist who has written on the characteristics of the post-industrial society; the late Herman Kahn, a former physicist and director of the Hudson Institute, whose sophisticated statistical analyses portray a primarily optimistic future based on technological progress; Robert Theobald, who stresses the importance of communications and broad-based popular participation for positive change; and others such as the late sociologist John McHale, and the Stanford scholar Willis Harman. You may wish to add to this list, for example, John Naisbitt of Megatrends fame, and in the organizational category, the World Future Society, which is headed by Edward Cornish out of Bethesda, Maryland.

This brings us to a brief discussion of the major methods used by futures. Methodologies for futures studies are categorized and even labeled somewhat differently by different futurists. For example, Schwarz, Svedin and Wittrock (1982), in their book Methods in Futures Studies, discuss four categories of

methods of futures studies: The Delphi Technique, trend extrapolation, scenario-writing, and mathematical models. Norman Henchy (1977) describes four kinds of futures: possible futures, preferable futures, probable futures and plausible futures. To each of these futures he links various methodologies, such as image building and systems building, forecasting and policy planning, trend analysis and comparative studies, and scenarios and insight. Finally, Peter Wagschal, in his PDK Handbook for Conducing Future Studies in Education (1984) describes under the general heading, forecasting techniques, ten different but related methods. These techniques include, in addition to the usually mentioned delphi, trend, and scenario methods, other methods such as the cross-impact matrix, force analysis, simulation and gaming, and the futures wheel (which we will use this afternoon). And to all of these we can to add the well-known method of brainstorming.

This is not the place - nor do I dare test your patience - for a description of all these methods. It is appropriate, however, to make several generalizations that are relevant to curriculum and instruction in the schools.

First, the array of methods for futures studies provides a rich body of legitimate and useful teaching methods for teachers of futures studies. Although futures studies is a relatively new field of study, there is a substantial body of thought-provoking techniques that teachers can use in planning course outlines and teaching approaches.

Second, although some futuring methods are highly sophisticated there are quite a few that can easily be used with secondary, even elementary, grade students. Furthermore, several of the methods lend themselves to variations in the hands of an imaginative teacher.

Third, the variety of methods helps to give a futures studies course a process, rather than a content, orientation. To a large degree the content is the methods, which means that no matter what the topic, e.g., space exploration, nuclear energy, population trends, social changes, students are being encouraged to think carefully and critically in a variety of different ways.

Fourth, and this is an extension of the previous point, futuring methodologies encourage students to think critically and creatively. Most often there is no final right answer. The quality of a student's view of the future will depend not on memorizing the right answer but on thinking carefully and with increasing sophistication about a variety of issues.

Fifth, futures studies methodologies require teachers and students to look at current critical issues not just from the

perspective of immediate gratification and self-interest but especially with a reasoned view of social and personal consequences. Of course it would be foolish to think or maintain that futures studies is a pancea for short sighted self-gratification of either students or adults. But careful futures studies, led by a creative teacher, offers an important balance to the pull that present concerns and prejudices have on students.

For today we will sample just two of the many interesting and useful methods that futurists use. One of these methods, The Future Wheel, we will actually use later this morning in order to experience some systematic futures thinking for ourselves. The second sample method is trend analysis and extrapolation. I will illustrate trend analysis and extrapolation with examples from three recent publications which identify, according to their analyses, the top ten trends.

The first and best known is the top 10 trends of John Naisbitt in Megatrends (1984). (Show transparancy.) By a method called content analysis, in which a large array of news sources are studied, Naisbitt says that he has identified ten new directions transforming our lives. Not everyone is as enamoured of Naisbitt's work as he himself is. I recommend that you read Louis Goldman's article, "Megatrends: Megahype, Megabad" in the September 1983 issue of Education Leadership.

A second top 10 trend list was published in the March 19, 1984 issue of U. S. News & World Report. (Show transparency.) U.S. News and Naisbitt agree on four trends: information society/computer revolution; foreign competition challenging U.S. economy or in Naisbitt's words from a national to a world economy; lure of the Sun Belt; and from big government to decentralized, participatory democracy. U.S. News mentions six trends not picked up by Naisbitt: growing power of minorities, decline of the superpower and the bipolar world system, medical miracles reducing killer diseases, a maturing society, women entering the work force, and boom in continuing and higher education.

A third top ten list has been offered by the Canadian John Kettle in his Futureletter (November 1983 - September 1984). (Show transparency). Not unexpectedly for a Canadian, Kettle does not mention the lure of the Sun Belt, but in agreement with U.S. News, Kettle points to a feminizing society, a middle-aging of the population, and an expansion of education to everyone. In the economic realm, Kettle foresees a flattening of the GNP, a dethroning of work, and a democratizing and decentralizing of capital.

This glimpse at three prominent top ten trends suggests both the importance and potential power of futures study for the

school curriculum. It is time now to turn our attention to the third point of my presentation, namely Curriculum for Futures Studies: How Do We Initiate Futures Studies in the Schools and What Are The Key Ingredients of Futures Studies Curriculum?

Ronald LaConte, in his useful and practical little book, Teaching Tomorrow Today, begins his rationale section with this sentence: "One of the glaring ironies of modern education is that schools try to prepare students to live in a time that does not yet exist by concentrating their studies on a time that has ceased to exist" (1975, p. 5). Then he goes on to write in an introduction to the course which his book describes, "A primary purpose of this course is to make students future-oriented: to turn their sights forward as well as backward, to help them see tomorrow as well as yesterday" (p. 5). LaConte's broad course goals are representative of many futures studies curricula and serve as a basic guide to planning a futures curriculum, regardless of the specific format. LaConte says the "basic goals of his course...are to help students understand the nature of change in modern society, to identify the most probable impending changes, and to clarify their values and order their priorities in light of these impending changes" (p.6).

The material which you received for this presentation has a recent article by LaConte in which he describes one-semester elective courses at the senior high level, most frequently associated with the social studies curriculum. For example the course at Burnsville High School in Burnsville, Minnesota, builds around an active, rather than passive, look at the future. Unlike the goals of LaConte's 1975 course, namely identifying probable changes and clarifying values in the light of impending changes, the Burnsville course asks students to "create and evaluate alternative images of themselves and the worlds in which they might live" (LaConte, 1983).

In a similar manner, the program at Jericho High School in Jericho, New York, has an action-oriented objective, namely to get students to engage the future actively through a variety of techniques. Robert Hoffman, creator and director of the program, uses both computer simulations and videotaping in stressing process, i.e., the evaluation of alternatives, rather than specific content.

LaConte offers a valuable summary of four elements that current and successful futures studies courses have in common.

> First, and probably most important, [futures courses] all treat the study of the future as an investigation of alternatives.
>
> Second, the emphasis is always on process,

> not content. Topics change from course to course and year to year, but the emphasis on problem solving, critical thinking, decision-making, and investigation remains constant.
>
> Third, these programs all see futures studies as a form of values clarification. (Although the term values clarification has come on bad times, the question of values and a personal understanding of values is critical to futures studies.)
>
> Fourth, there is a consistent concern with the development of a sense of consequences, with getting students to view actions and decisions as part of a broad "if...then" sequence and to understand the individual's responsibility for the future. (LaConte, 1983, p. 44).

Fitch and Svengalis offer many insightful and practical suggestions for both the curriculum specialist and the teacher in designing and implementing futures studies in some part of the school curriculum. I say "some part of the school curriculum", because futures studies may be introduced and organized in one of three ways, all familiar to curriculum specialists. Of course, there is the separate course approach, for which there are many successful examples (I refer you to your material for brief descriptions of such courses and references for attaining more information). A second approach is to introduce a separate unit on some future-related topic into a standard social studies course or perhaps an English course. The third approach is the "infusion" approach where future-oriented ideas and concepts are more or less integrated into the standard curriculum. Fitch and Svengalis offer practical examples for all three approaches.

The choice of curriculum approaches, of course, depends on several factors. The infusion approach has the attraction of giving a future-orientation throughout the curriculum (at least in those subjects in which it is appropriate), and has the advantage of not introducing yet another new course. However, it has the disadvantage of requiring fairly extensive change in thinking and acting by many teachers. True infusion usually requires an interested and talented principal who works in a highly effective and facilitative manner with teachers in the area of curriculum and instruction. A strong argument can be made for infusion, and it is certainly desirable but only (1) with careful planning at the school level, (2) with initially receptive principal and faculty, and (3) with an outlay of some additional resources. I'll come back to this idea in a moment. (By the way, if you are confident that you can accomplish

effective infusion by a top-down curriculum process from central administration to the schools, I certainly do not want to stand in your way. I will just have to say that I am of the opinion that effective change, for example infusion of a futures orientation throughout a curriculum, typically cannot be successfully mandated from the top. Rather, effective infusion requires enthusiastic commitment by appropriate top administrators who then find creative ways to work collegially with a group of receptive principals and teachers to begin a successful program. My hope is that you will leave here today with enough conviction, enthusiasm, commitment, knowledge - and where to get more knowledge - to begin a process of change for futures studies in your school districts.)

The introduction of a single special elective course at the senior high level is a manageable and potentially effective manner of introducing futures studies into the school curriculum. There are probably some of you who can describe such a course in one or more of the schools in your districts. The design for an effective course starts with clarity about goals and objectives for the course. The very nature of the issues and materials of futures studies suggest a variety of specific objectives which one may choose from. For some concrete help in thinking about course goals I recommend the 20 goals which Fitch and Svengalis specify in their book, Futures Unlimited: Teaching About Worlds To Come.

An example of a futures studies course is shown in this transparency. (Show course transparency.) This is just one of many possible outlines that could be constructed.

The third approach to futurism in the curriculum is by way of separate units, especially in social studies courses, but necessarily limited to them. This transparency shows examples of three such units as suggested by Fitch and Svengalis. (Show units transparency.)

Let me wrap up this third point on futures studies curriculum with a single final specific suggestion for initiating a futures studies course, or unit, or infusion process, especially in those places in which there has been no prior work in the area. I must warn you, however, that this idea will cost you some initial investment money. This summer the World Future Society is holding its World Assembly in Washington, D.C. The World Future Society assemblies are exciting and enriching meetings that can generate enthusiasm and many good ideas in receptive participants. Perhaps you can find money to fund a teacher and a principal from one of your schools to attend this meeting with the subsequent responsibility for designing and teaching a futures studies course and conducting a professional development day in futurism for teachers in their schools. To

qualify for selection, the teacher and principal would have to submit evidence of their interest in the project and their knowledge of futurism or their willingness to prepare for the meeting. In addition they would have to outline how they plan to work together on a futurism course and staff development. The school district's commitment will be to fund them for the meeting and provide some additional modest resources for implementing the course and in-school professional development. Given the proximity of Montgomery schools to Washington and futures studies resources, a project like this has the potential to generate the enthusiasm, knowledge and skills necessary to successfully initiate futures studies in your curriculum. However, if this suggestion does not appeal to you or is beyond the means of your school district's budget, I encourage you, nevertheless, to follow up today's activity with one of the standard in-house curriculum development methods with which you are so familiar, for example, by forming a small task force of interested and skillful teachers and administrators, preferably with some help from an outside teacher who has successful experience in teaching a futurism course.

I have come now to the conclusion of my presentation and three points on (1) the value of futures studies, (2) the methods of futures studies, and (3) curriculum development for futures studies. I will close my presentation with two brief quotes which I hope will act not only as a conclusion to my presentation but more importantly will serve as a firm nudge for you to act on futurism in your school's curricula.

Robert Jungk, (1977) says quite simply and unequivocally, "The future begins in the schools."

And, finally, Louis Rubin (1975) has written:

"Because ideas, properly sown and nutured, are a form of power, there is much to be said for a school in which images of the future are conveyed. Though we cannot now, with finality, determine what will be taught in the future, or how schools should be arranged, or what teaching methodologies will be at our disposal, we can make judgments concerning what the young ought to know about the probable events that lie ahead. One can scarcely deny that the present instructional program is a bit top-heavy with respect to the past and present, that the attention given to social problems and trends is deficient. There is abundant evidence, for example, that the earth's resources need rebalancing, the population demands regulation, and that painful conservation tactics must be initiated. If, indeed, education consists of developing worthy citizenship, such conceptions would seem to warrant a place in the curricular scene." (p. 198)

References

Bell, Wendell (1974). Social science: The future as a missing variable. In A. Toffler (Ed.), Learning for tomorrow: The role of the future in education, New York: Random House.

Cornish, Edward (1978). Toward a philosophy of futurism. The Futurist, 11(6), 380-81.

Fitch, Robert M., & Svengalis, Cordell M. (1979). Futures unlimited: Teaching about worlds to come. Washington, D.C.: National Council for the Social Studies.

Goldman, Louis (1983). Megatrends: Megahype, megabad. Educational Leadership, 41 (1), 55-57.

Griffith, Priscilla P. (1974). Teaching the twenty-first century in a twentieth-century high school. In A Toffler (Ed.), Learning for tomorrow: The role of the future in education, New York: Randon House, 197-216.

Henchy, Norman (1977). Building a framework for the study of the future. World future Society Bulletin, 11 (5), 1-9.

Jungk, Robert (1977). The everyman project. New York: Liveright. Quoted in Fitch & Svengalis, Futures unlimited, Washington, D.C.: National Council for the Study of Social Studies, 1979, p. 7.

Kettle, John (1984). John Kettle's Futureletter, November 1983 through September 30, 1984.

Kirk, Maurice (1984). The return of Malthus? The global demagraphic future, 2000-2050. Futures, April 1984, 124-138.

LaConte, Ronald T. (1983). Teaching the future. Educational Leadership, 41 (1), 40-44.

LaConte, Ronald T. (1975). Teaching tomorrow today: A guide to futuristics. New York: Bantam Books.

Naisbitt, John (1984). Megatrends: Ten new directions transforming our lives. New York: Warner.

Rubin, Louis (Ed.) (1975). The future of education: Perspectives on tomorrow's schools. Boston: Allyn and Bacon.

Sawyer, Kathy (1985) Falwell attempts to mend interfaith fences. The Washington Post, April 4, 1985, A4.

References
Page 2

Schrage (1985) Soon drugs may make us smarter. The Washington Post, February 3, 1985, C1.

Schwarz, Brita, Svedin, Uno, and Withrock, Bjorn (1982). Methods in futures studies: Problems and applications. Boulder, Colorado: Westview.

Steinbrink, John E. (1983). Precollege global education: Goals and scenarios. World Futures, 19, 37-46.

U.S. News & World Report, March 19, 1984, 40-52

Transparencies

10 Top Trends
1984

U.S. News

1. Maturing Society in Which Middle-Aged and Elderly Set Pace
2. Lure of the Sun Belt
3. Computer Revolution/Information Age
4. Foreign Competition Challenging US Supremacy
5. Women Entering Labor Force and Politics
6. Minorities Gaining Power As Their Numbers Grow
7. Decline of Superpowers and of Concept of A Bipolar System
8. Declining Public Confidence in Big Government
9. Boom in Higher and Continuing Education
10. Medical Miracles Reducing Threat of Killer Diseases

U.S. News & World Report, March 19, 1984, 40-52

Kettle

1. Locking the Factory Gates
2. Feminizing Society
3. Going Post-Industrial
4. Democratizing and Decentralizing Capital
5. Globalizing the Economy
6. Flattening the GNP
7. Consuming Information
8. Middle-Aging of Population
9. Educating Everyone
10. Dethroning Work

John Kettle's Futureletter, November 30, 1983 - September 30, 1984

Naisbitt

1. Information Society
2. High Tech/High Touch
3. From National Economy to World Economy
4. From Short Term to Long Term Planning
5. From Centralization to Decentralization
6. From Institutional Help to Self-Help
7. From Representative Demmocracy to Participatory Democracy
8. From Hierachies to Networking
9. From North to South
10. From Either/or to Multiple Options

John Naisbitt, Megatrends: Ten New Directions Transforming Our Lives, New York: Warner Books, 1984

Transparencies
Page 2

Separate Units on Futurism Within Standard Courses

American History Units

1. "Images of America in the Year 2000"
2. "Toward America's Tricentennial"
3. "Social Change and the American Future"
4. "From the New Deal to the Opportunity Society"

World History Units

1. "Prospects for Global War or Peace"
2. "The United States and Russia in the Year 2050"
3. "The Prospects for World Unity"
4. "Projecting World Trends: Social, Political, Economic, Demographic"

Sociology Units

1. "The Future of the Family"
2. "Changing Life Styles for the Future"
3. "Work and Leisure in the Year 2000"
4. "Women's Roles in the Year 2000"
5. "Race Relations in the Year 2000"
6. "The Future of Mass Communications"

Psychology Units

1. "Adapting to Rapid Change"
2. "Psychopharmacology and Mind Control"
3. "The Psychology of Prediction"
4. "Creativity: The Mind Designs the Future"

With special thanks to Fitch & Svengalis, Futures Unlimited: Teaching About World to Come

Outline of a Separate Course in Futurism

Title: "Exploring the World of Tomorrow"

I. Why Study the Future?
   A. The Challenge of Change
      1. How Fast and How Much
   B. Making a Difference

II. Can We Know the Future?
   A. The Futurists
   B. Predicting the Future
   C. The Role of Science Fiction
   D. Ways of Thinking About the Future (Methods)

III. What's the Future Going to Be?
   A. Top 10 Trends
   B. Optimism vs Pessimism:
      1. Population and Food
      2. War and Peace
      3. Wealth and Poverty
      4. Environment and Development
      5. Global Interdependence or World Division
   C. Medical "Miracles"
   D. Space
   E. Computers and Robots
   F. Work and Leisure

IV. What Values Do We Need in the Future?
   A. Social and Individual Responsibilities
      1. Self-Interest and Social Responsibility
   B. Participation and Self-Discipline
      1. Competent, Caring Citizenship
      2. The World View